

In the claims:

Following is a complete set of claims as amended with this Response.

1. (Currently Amended) A method comprising:

transmitting a first broadcast message in a broadcast channel at a first specific time within a first assigned slot of a predetermined frame from a first broadcasting terminal of a radio communications system, the first broadcast message including a first broadcast information sequence that includes a power sequence that is related to the power used to transmit the first broadcast message;

transmitting a second broadcast message in the broadcast channel at a second specific time within a second assigned slot of the predetermined frame from a second broadcasting terminal of the radio communications system, the second broadcast message including a second broadcast information sequence that includes a power sequence that is related to the power used to transmit second broadcast message; and

receiving a message from a user terminal, the received message being timed relative to the first broadcast message to distinguish the received message as being directed to the first broadcasting terminal.

2. (Previously Presented) The method of Claim 1, further comprising transmitting further broadcast messages in the broadcast channel at further specific times within further assigned slots of a predetermined frame from further broadcasting terminals of the radio communications system, the further broadcast messages including further broadcast information sequences.

3. (Original) The method of Claim 1, wherein the predetermined frame is a repeating frame.

4. (Previously Presented) The method of Claim 1, wherein the specific transmission times are determined based on a common timing reference received by each broadcasting terminal.

5. (Previously Presented) The method of Claim 4, wherein the common timing reference is a satellite clock transmission received by a satellite receiver at each broadcasting terminal.

6. (Previously Presented) The method of Claim 1, wherein the respective broadcast information sequences includes a code to identify the respective broadcasting terminal.

7. (Previously Presented) The method of Claim 6, wherein the code to identify the broadcasting terminal comprises a base station color code.

8. (Canceled).

9. (Previously Presented) The method of Claim 1, wherein the respective broadcast information sequences include a load sequence that is related to the current traffic load at the respective broadcasting terminal.

10. (Currently Amended) A method comprising:

receiving a first broadcast message in a broadcast channel at a first specific time within a first assigned slot of a predetermined frame from a first broadcasting terminal of a radio communications system, the first broadcast message including a first broadcast information sequence that includes a load sequence that is related to the current traffic load at the first broadcasting terminal;

receiving a second broadcast message in the broadcast channel at a second specific time within a second assigned slot of the predetermined frame from a second broadcasting terminal of the radio communications system, the second broadcast message including a second broadcast information sequence that includes a load sequence that is related to the current traffic load at the second broadcasting terminal; and

transmitting a message from a user terminal having a timing relationship with the predetermined frame, the message being directed to a specific broadcasting terminal based on the timing relationship with the predetermined frame.

11. (Previously Presented) The method of Claim 10, further comprising receiving further broadcast messages in the broadcast channel at further specific times within further assigned slots of a predetermined frame from further broadcasting terminals of the radio communications system, the further broadcast messages including further broadcast information sequences.

12. (Original) The method of Claim 10, wherein the predetermined frame is a repeating frame.

13. (Previously Presented) The method of Claim 10, wherein the specific transmission times are determined based on a common timing reference received by each broadcasting terminal.

14. (Previously Presented) The method of Claim 13, wherein the common timing reference is a satellite clock transmission received by a satellite receiver at each broadcasting terminal.

15. (Previously Presented) The method of Claim 10, wherein the respective broadcast information sequences include a code to identify the respective broadcasting terminal.

16. (Previously Presented) The method of Claim 15, wherein the code to identify the respective broadcasting terminal comprises a base station color code.

17. (Previously Presented) The method of Claim 10, wherein the respective broadcast information sequences include a power sequence that is related to the power used to transmit the respective broadcast message.

18. (Canceled).

19. (Currently Amended) A machine-readable medium having stored thereon data representing sequences of instructions which, when executed by a machine, cause the machine to perform operations comprising:

transmitting a first broadcast message in a broadcast channel at a first specific time within a first assigned slot of a predetermined frame from a first broadcasting terminal of a radio communications system, the first broadcast message including a first broadcast information sequence that includes a load sequence that is related to the current traffic load at the first broadcasting terminal;

transmitting a second broadcast message in the broadcast channel at a second specific time within a second assigned slot of the predetermined frame from a second broadcasting terminal of the radio communications system, the second broadcast message

including a second broadcast information sequence that includes a load sequence that is related to the current traffic load at the second broadcasting terminal; and

receiving a message from a user terminal, the received message being timed relative to the first broadcast message to distinguish the received message as being directed to the first broadcasting terminal.

20. (Previously Presented) The medium of Claim 19, the instructions causing the machine to perform further operations comprising transmitting further broadcast messages in the broadcast channel at further specific times within further assigned slots of a predetermined frame from further broadcasting terminals of the radio communications system, the further broadcast messages including further broadcast information sequences.

21. (Previously Presented) The medium of Claim 19, wherein the specific transmission times are determined based on a common timing reference received by each broadcasting terminal.

22. (Previously Presented) The medium of Claim 19, wherein the respective broadcast information sequences include a code to identify the respective broadcasting terminal.

23. (Previously Presented) The medium of Claim 19, wherein the respective broadcast information sequences include a power sequence that is related to the power used to transmit the respective broadcast message.

24. (Canceled)

25. (Currently Amended) A machine-readable medium having stored thereon data representing sequences of instructions which, when executed by a machine, cause the machine to perform operations comprising:

receiving a first broadcast message in a broadcast channel at a first specific time within a first assigned slot of a predetermined frame from a first broadcasting terminal of a radio communications system, the first broadcast message including a first broadcast information sequence that includes a power sequence that is related to the power used to transmit the first broadcast message;

receiving a second broadcast message in the broadcast channel at a second specific time within a second assigned slot of the predetermined frame from a second broadcasting terminal of the radio communications system, the second broadcast message including a second broadcast information sequence that includes a power sequence that is related to the power used to transmit the second broadcast message; and

transmitting a message from a user terminal having a timing relationship with the predetermined frame, the message being directed to a specific broadcasting terminal based on the timing relationship with the predetermined frame.

26. (Previously Presented) The medium of Claim 25, the instructions causing the machine to perform further operations comprising transmitting further broadcast messages in the broadcast channel at further specific times within further assigned slots of a predetermined frame from further broadcasting terminals of the radio communications system, the further broadcast messages including further broadcast information sequences .

27. (Previously Presented) The medium of Claim 25, wherein the respective broadcast information sequences include a code to identify the respective broadcasting terminal.

28. (Canceled)

29. (Previously Presented) The medium of Claim 25, wherein the respective broadcast information sequences include a load sequence that is related to the current traffic load at the respective broadcasting terminal.

30. (Currently Amended) An apparatus comprising:  
a first transmitter at a first broadcasting terminal of a radio communications system to transmit a first broadcast message in a broadcast channel at a first specific time within a first assigned slot of a predetermined frame, the first broadcast message including a first broadcast information sequence that includes a power sequence that is related to the power used to transmit the first broadcast message;

a second transmitter at a second broadcasting terminal of the radio communications system to transmit a second broadcast message in the broadcast channel

at a second specific time within a second assigned slot of the predetermined frame, the second broadcast message including a second broadcast information sequence that includes a power sequence that is related to the power used to transmit the second broadcast message; and

a receiver at the first and second broadcasting terminals, respectively to receive a message from a user terminal, the received message being timed relative to the first broadcast message to distinguish the received message as being directed to the first broadcasting terminal.

31. (Previously Presented) The apparatus of Claim 30, further comprising further transmitters of further broadcasting terminals of the radio communications system to transmit further broadcast messages in the broadcast channel at further specific times within further assigned slots of the predetermined frame, the further broadcast messages including further broadcast information sequences.

32. (Previously Presented) The apparatus of Claim 30, wherein the first and the second broadcasting terminals further comprise a timing reference receiver to receive a timing reference common to the first broadcasting terminal and the second broadcasting terminal.

33. (Previously Presented) The apparatus of Claim 30, wherein the respective broadcast information sequences include a code to identify the respective broadcasting terminal.

34. (Canceled)

35. (Previously Presented) The apparatus of Claim 30, wherein the respective broadcast information sequences include a load sequence that is related to the current traffic load at the respective broadcasting terminal.

~~36. (Currently Amended) An apparatus comprising:~~

means for transmitting a first broadcast message in a broadcast channel at a first specific time within a first assigned slot of a predetermined frame from a first broadcasting terminal of a radio communications system, the first broadcast message including a first broadcast information sequence, the first broadcast information sequence

containing no explicit channel assignment and no explicit broadcasting terminal assignment and including a load sequence that is related to the current traffic load at the first broadcasting terminal;

means for transmitting a second broadcast message in the broadcast channel at a second specific time within a second assigned slot of the predetermined frame from a second broadcasting terminal of the radio communications system, the second broadcast message including a second broadcast information sequence that includes a load sequence that is related to the current traffic load at the second broadcasting terminal; and

means for receiving a request message at the first broadcasting terminal from a user terminal, the request message being timed relative to the first broadcast message to indicate that the request message is directed to the first broadcasting terminal and not to the second broadcasting terminal, the request message containing no explicit identification of the first broadcasting terminal.

37. (Previously Presented) The apparatus of Claim 36, further comprising means for transmitting further broadcast messages in the broadcast channel at further specific times within further assigned slots of a predetermined frame from further broadcasting terminals of the radio communications system, the further broadcast messages including further broadcast information sequences containing no explicit channel assignment and no explicit broadcasting station assignment:

38. (Original) The apparatus of Claim 36, means for receiving a common timing reference and means for determining the specific transmission times based on the common timing reference.

39. (Previously Presented) The apparatus of Claim 36, wherein the respective broadcast information sequences include a code to identify the broadcasting terminal.

40. (Previously Presented) The apparatus of Claim 36, wherein the code to identify the broadcasting terminal comprises a base station color code.

41. (Previously Presented) The apparatus of Claim 36, wherein the respective broadcast information sequences include a power sequence that is related to the power used to transmit the respective broadcast message.

42. (Previously Presented) The apparatus of Claim 36, wherein the respective broadcast information sequences include a load sequence that is related to the current traffic load at the respective broadcasting terminal.

43. (Currently Amended) A broadcast channel in a radio communications system, the channel comprising:

a repeating frame shared by a plurality of broadcasting terminals, the frame having a plurality of slots, each broadcasting terminal being assigned to a slot;

a predetermined timing assigned to each slot, so that each slot of the frame is synchronized at all broadcasting terminals;

a broadcast burst message for each broadcasting terminal, for transmission in the respective assigned slot, the burst message having a broadcast information sequence that includes a power sequence that is related to the power used to transmit the respective timing message; and

an uplink request channel having a plurality of slots to allow a user terminal to request a traffic channel, each slot of the uplink request channel having a timing relationship with the slots of the repeating frame to distinguish uplink requests sent to different ones of several nearby broadcasting terminals.

44. (Previously Presented) The channel of Claim 43, wherein the broadcast information sequence includes a code to identify the transmitting broadcasting terminal.

45. (Previously Presented) The channel of Claim 43, wherein the predetermined timing is based on a common timing reference received by each broadcasting terminal.

46. (Previously Presented) The channel of Claim 45, wherein the common timing reference is a satellite clock transmission received in a satellite receiver at each broadcasting terminal.

47. (Original) The channel of Claim 43, further comprising a frequency hopping sequence.



48. (Currently Amended) A method for accessing a wireless network, comprising:

receiving a plurality of timing sequences on a broadcast channel, each timing sequence being received from a different one of a plurality of broadcasting terminals and each timing sequence including a power sequence that is related to the power used to transmit the respective timing message;

determining network timing using the received timing sequences;

selecting one from among the plurality of broadcasting terminals using the received timing sequences;

transmitting a message to the selected broadcasting terminal, the message being timed relative to a selected one of the timing sequences to distinguish the message as being directed to the selected one of the broadcasting terminals.

49. (Previously Presented) The method of Claim 48, wherein the timing sequences are received with at least one frequency and wherein the method further comprises using the received timing sequences to determine a broadcasting terminal selection message frequency based on the frequency of the received timing sequences.

50. (Original) The method of Claim 48, wherein the message is transmitted omnidirectionally.

51. (Previously Presented) The method of Claim 48, wherein the timing sequences are synchronized based on a common timing reference received by each broadcasting terminal.

52. (Previously Presented) The method of Claim 51, wherein the common timing reference is a satellite clock transmission received in a satellite receiver at each broadcasting terminal.

53. (Previously Presented) The method of Claim 48, further comprising receiving broadcasting terminal identifiers on the broadcast channel, the broadcasting terminal identifiers each being associated with a respective timing sequence and using the broadcasting terminal identifiers to distinguish broadcasts from different broadcasting terminals on the broadcast channel.

54. (Previously Presented) The method of Claim 53, wherein transmitting a broadcasting terminal selection message further comprises transmitting a broadcasting terminal identifier.

55. (Previously Presented) The method of Claim 48, wherein transmitting a broadcasting terminal selection message further comprises transmitting an identifier of the transmitter.

56. (Currently Amended) A machine-readable medium having stored thereon data representing sequences of instructions which, when executed by a machine, cause the machine to perform operations comprising:

receiving a plurality of timing sequences on a broadcast channel, each timing sequence being received from a different one of a plurality of broadcasting terminals and each timing sequence including a load sequence that is related to the current traffic load at the respective broadcasting terminal;

determining network timing using the received timing sequences;

selecting one from among the plurality of broadcasting terminals using the received timing sequences;

transmitting a message to the selected broadcasting terminal, the message being timed relative to a selected one of the timing sequences to distinguish the message as being directed to the selected one of the broadcasting terminals.

57. (Previously Presented) The medium of Claim 56, wherein the timing sequences are received with at least one frequency, the instructions further causing the machine to perform operations comprising using the received timing sequences to determine a broadcasting terminal selection message frequency based on the frequency of the received timing sequences.

58. (Previously Presented) The medium of Claim 56, the instructions causing the machine to perform further operations comprising synchronizing the timing sequences based on a common timing reference received by each broadcasting terminal.

59. (Previously Presented) The medium of Claim 56, the instructions causing the machine to perform further operations comprising receiving broadcasting terminal identifiers on the broadcast channel, the broadcasting terminal identifiers each being

associated with a respective timing sequence and using the broadcasting terminal identifiers to distinguish broadcasts from different broadcasting terminals on the broadcast channel.

60. (Previously Presented) The medium of Claim 56, wherein transmitting a broadcasting terminal selection message further comprises transmitting a broadcasting terminal identifier.

61. (Previously Presented) The medium of Claim 56, wherein the instructions for transmitting a broadcasting terminal selection message further comprise instructions causing the machine to perform operations comprising transmitting an identifier of the transmitter.

62. (New) A broadcast channel in a radio communications system, the channel comprising:

- a repeating frame shared by a plurality of broadcasting terminals, the frame having a plurality of slots, each broadcasting terminal being assigned to a slot;

- a predetermined timing assigned to each slot, so that each slot of the frame is synchronized at all broadcasting terminals;

- a broadcast burst message for each broadcasting terminal, for transmission in the respective assigned slot, the burst message having a broadcast information sequence that includes a load sequence that is related to the current traffic load at the respective broadcasting terminal; and

- an uplink request channel having a plurality of slots to allow a user terminal to request a traffic channel, each slot of the uplink request channel having a timing relationship with the slots of the repeating frame to distinguish uplink requests sent to different ones of several nearby broadcasting terminals.

63. (New) The channel of Claim 62, wherein the broadcast information sequence includes a code to identify the transmitting broadcasting terminal.

64. (New) The channel of Claim 62, wherein the predetermined timing is based on a common timing reference received by each broadcasting terminal.

65. (New) The method of Claim 62, wherein the respective broadcast information sequences include a code to identify the respective broadcasting terminal.

66. (New) The method of Claim 65, wherein the code to identify the respective broadcasting terminal comprises a base station color code.

67. (New) The method of Claim 62, wherein the respective broadcast information sequences include a power sequence that is related to the power used to transmit the respective broadcast message.